

# Microprocessor controller JDI-22 / JDU-210

NEW

For PT-100 / PT-1000 sensors and measuring transducer  
DIN built-in housing



### Technical data

**Operating voltage:** 230 V~. 50 / 60 Hz  
**Switching capacity:** changeover contact:  
10 (2) A, 24 ... 250 V~  
make contact:  
5 (1) A, 24 ... 250 V~  
**Contact:** 1 relay as potential-free changeover contact, 1 relay as potential-free make contact  
**Sensor or standard signal inputs:** see table below  
**Resolution:** 0.1°C (PT-100, -50 ... +200°C)  
1.0°C (PT-100 / -1000, -200 ... +850°C)  
**Accuracy:** PT-100 / -1000:  
<0.3 % FS ± 1 digit  
Standard signal:  
<0.2 % FS ± 1 digit  
always at nominal temperature (=25°C)  
**Measuring rate:** **JDI-22:** approx. 4 measurements / s  
**JDU-210:** approx. 4 measurements / s with PT ..., approx. 100 measurements / s at normal signal  
**Supply of measuring transducer (JDU-210):** 24V ± 5 % / 20 mA, galvanically isolated  
**Ambient conditions:** -20...+50°C, 0...80 % r.h. (non condensing)  
**Degree of protection:** IP 54 (front)  
**Protection class:** II (front)  
**Terminals:** terminal screws / plug-in terminals (max. 1.5 mm<sup>2</sup>)  
**Mounting / installation:** front panel installation

### Application

2 / 3-point controller for control and/or supervision of temperatures existing in liquid or gasiform media with decimal display of set/ actual value for front panel installation.

Suited for use as digital remote controller in industry and agriculture and in the machine building and apparatus engineering sphere. The controllers are equipped with a serial interface. Cross-linking and data acquisition is possible via PC. The connection to an RS 232 interface is possible only when using an appropriate interface connector. Especially our standard signal measuring transducers are qualified for use with the controller model JDU-210. In this case, the measuring transducer itself will determine the corresponding physical value.

**Sensors and measuring transducers are not included in the scope of the delivery.** (As for choice of sensors or measuring transducers available, see as of page 99).

Avoid parallel laying of sensor line and mains supply cables or protect it by shielding.

#### Relay terminal allocation:

**Relay 1:** Terminal 3 – input  
Terminal 4 – make contact  
**Relay 2:** Terminal 5 – input  
Terminal 6 – make contact  
Terminal 7 – break contact

Replaces the out-dated model variants JDI-21 (JDI-22) and JDI-210 / JDR 10 / JDR-210 (JDU-210)!

| Type    | Item No.    | Control range                                 | Control function  | Interface | Sensor  | PG |
|---------|-------------|---|---|-----------|---|----|
| JDI-22  | G 800039800 | -50,0...+200,0°C                              | 2 / 3-point controller                                  | serial    | PT 100 2 / 3-conductor)   | J  |
| JDU-210 | G 800039900 | -200,0...+850,0°C<br>-1999...+9999, ± 1 digit | 2 / 3-point controller<br>2 point controller with alarm | serial    | PT 100 (3-conductor)<br>PT 1000 (2-conductor)<br>0 ... 20 mA, 4...20 mA,<br>0 ... 1 V, 0 ... 10 V | J  |

